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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/074,625	02/13/2002	Victor Tang	051373-0118 (24)	7343

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ART UNIT	PAPER NUMBER
2141	

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Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)
Office Action Summary	10/074,625	TANG ET AL.
	Examiner	Art Unit	
	Chirag R. Patel	2141	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE <u>3</u> MONTH(S) FROM
THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1) ☒ Responsive to communication(s) filed on *12 February 2002*.
2a) ☐ This action is **FINAL**.   2b) ☒ This action is non-final.
3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4) ☒ Claim(s) *1-20* is/are pending in the application.
    4a) Of the above claim(s) _____ is/are withdrawn from consideration.
5) ☐ Claim(s) _____ is/are allowed.
6) ☒ Claim(s) *1-20* is/are rejected.
7) ☐ Claim(s) _____ is/are objected to.
8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9) ☐ The specification is objected to by the Examiner.
10) ☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.
    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
    a)☐ All b)☐ Some * c)☐ None of:
      1.☐ Certified copies of the priority documents have been received.
      2.☐ Certified copies of the priority documents have been received in Application No. _____.
      3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

    (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claim 1 is rejected under 35 U.S.C. 102(b) as being anticipated by Bodnar (US 6,061,790).

As per claim 1, Bodnar discloses a method of protecting a username during authentication, the method comprising:

obtaining a plain text username over a secure communication channel; (Col 6 lines 14-16, Col 7 lines 50-53)

obtaining a server identifier for a server; (Col 6 lines 11-14)

obscuring the plain text username using the server identifier; (Col 8 lines 59-67)

providing the obscured username and the plain text username to the server; (Col 7 lines 50-57, Col 8 lines 64-67, Col 9 lines 1-8)

and communicating authentication information including the obscured username over a non-secure communication channel from a client. (Col 6 lines 14-16, Col 8 lines 64-67) The client generates a enciphered fingerprint H1, identifies ownership from the user and represents the obscured username.

As per claim 2, Bodnar discloses the method of claim 1 wherein the server

identifier is a uniform resource locator (URL) corresponding to the server. (Col 6 lines

14-16) URL is inherent to TCP via the Internet.

As per claim 3, Bonar discloses the method of claim 1, wherein the server

identifier is an authentication domain corresponding to the server. (Col 9 line 1, Col 9

lines 9-21)

As per claim 4, Bonar discloses the method of claim 1, wherein obscuring the

plain text username using the server identifier comprises encrypting the plain text

username using an encryption method. (Col 7 lines 24-27, Col 8 lines 59-67)

As per claim 6, Bodnar discloses the method of claim 1, wherein the client is a

wireless device. (Col 2 lines 25-28, Col 12 lines 27-30) A cellular phone is a wireless

device.

As per claim 7, Bodnar discloses the method of claim 1, wherein obtaining a plain

text username over a secure communication channel comprises establishing an

encrypted communication session between the user and the server and communicating

a plain text username from the user to the server. (Col 7 lines 50-53, Col 8 lines 59-63)

As per claim 8, Bodnar discloses the method of claim 1, wherein the authentication information satisfies a plain text, unencrypted authentication scheme. (Col 6 lines 14-16, Col 6 lines 29-31)

As per claim 9, Bodnar discloses the method of claim 1, wherein the server identifier is a combination of an authentication domain and a uniform resource locator (URL) of the server; (Col 6 lines 14-16, Col 9 line 1, Col 9 lines 9-21) URL is inherent to TCP via the Internet.

As per claim 10, Bodnar discloses a username protection process comprising: registering a user with a selected server by requesting and receiving a plain text user identifier,   (Col 6 lines 11-16, Col 7 lines 50-53)
creating an obscure version of the plain text user identifier; (Col 8 lines 63-67) The client generates a enciphered fingerprint H1 , identifies ownership from the user and represents the obscured username.
and storing the plain text user identifier and the obscure version of the plain text user identifier on the selected server; (Col 7 lines 56-57, Col 8 lines 64-67, Col 9 lines 9-11) and initiating a communication session between the user and the selected server by the communication of the obscure version of the plain text user identifier over a plain text communication channel. (Col 6 lines 14-16, Col 8 lines 64-67)

As per claim 11, Bodnar discloses the process of claim 10, wherein the user is a wireless client device communicating over a non-encrypted channel. (Col 2 lines 25-28, Col 12 lines 27-30) A cellular phone is a wireless device.

As per claim 12, Bodnar discloses the process of claim 10, wherein communication over a plain text channel involves the obscure version of the plain text user identifier (Col 6 lines 12-14, Col 8 lines 59-63) and communication over a secure channel can use the plain text user identifier. (Col 6 lines 14-16, Col 7 lines 50-53)

As per claim 14, Bodnar discloses a system for protecting a username during authentication over a non-encrypted channel, system comprising:
a client device being configured to communicate information over unsecure communication channels; (Col 6 lines 14-16, Col 6 lines 29-31)
and a server having stored therein a plain text user identifier communicated by the client device over a secure communication channel and an obscured user identifier corresponding to the plain text user identifier. (Col 7 lines 50-53, Col 8 lines 64-67, Col 9 lines 1-11)

As per claim 15, Bodnar discloses the system of claim 14, further comprising a registration device being configured to communicate information over secure communication channels. (Col 7 lines 37-45) The JAVA enabled terminal serves as the registration device.

As per claim 16, Bodnar discloses the system of claim 15, wherein the client device and registration device are the same device. (Col 7 line 36, Col 7 line 41, Col 7 line 50-58) The JAVA enabled terminal serves both as a client and registration device.

As per claim 17, Bodnar discloses the system of claim 14, wherein the client device does not encrypt communication when communicating with the obscured user identifier created from the plain text user identifier; The client does not encrypt information over an open channel such as TCP/IP via the Internet and communicates unsecurely. (Col 6 lines 12-14, Col 6 lines 29-31)

As per claim 19, Bodnar discloses the system of claim 14, wherein the obscured user identifier corresponding to the plain text user identifier is created by encrypting the plain text user identifier with a key. (Col 8 lines 59-67)

As per claim 20, Bodnar discloses the system of claim 19, wherein the key is based on the uniform resource locator (URL) of the server or an authentication domain of the server. (Col 6 lines 11-16)

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claim 5 is rejected under 35 U.S.C. 103(a) as being unpatentable over Bodnar (US 6,061,790) in view of Droge (US 2002/0004898)

As per claim 5, Bondar discloses the method of claim 1, however, fails to discloses an advanced encryption standard (AES) as a method of encryption. Droge discloses wherein the encryption method is advanced encryption standard (AES). [0050]. It would have been obvious to a person of ordinary skill in the art at the time the invention to incorporate advanced encryption standard (AES) in the disclosure of Bondar because it allows for algorithms that may be used to encrypt data at both the data link and IP layers. [0051]

Claims 13 and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bodnar (US 6,061,790) in view of Shi et al. (US 5,875,296).

As per claims 13 and 18, Bodnar discloses the process of claim 10 and 14 and however, fails to disclose wherein the obscure version and plain text versions are stored on the client device. Shi et al. discloses wherein the client device has stored therein the plain text user identifier and the obscured user identifier. Shi et al. discloses storing user identifiers on client machines, secure and unsecure using cookies. (Col 9 lines 8-10, Col 7 lines 64-67, Col 8 lines 1-2) It would have been obvious to a person of

ordinary skill in the art at the time the invention to incorporate a plain text user identifier

and the obscured user identifier in the disclosure of Bodnar because the client does not

need to repeatedly transfer user's id and password over the network to reduce the

chances of being attacked by intruders. (Col 3 lines 40-46, Col 2 lines 66-67, Col 3

lines 1-2)

Conclusion

The prior art made of record and not relied upon is considered pertinent to

applicant's disclosure. Gregg et al. (US 6,516,416)discloses a system and method for

controlling access to computer resources using an untrusted network. Wright (US

6,052,466) discloses partitioning a private key generated cipher stream into an indexed

sequence of secondary keys. Shambroom (US 5,923,756) discloses providing secure

remote command execution over an insecure computer network. Goss (US 4,956,863)

discloses a cryptographic method and apparatus for public key exchange with

authentication. Hellman et al. (US 4,218,582) discloses allowing authorized parties to a

conversation to converse privately and authenticate another converser's identity.

Hellman et al. (4,200,770) discloses the Diffe-Hellman protocol.

Any inquiry concerning this communication or earlier communications from the

examiner should be directed to Chirag R. Patel whose telephone number is (571)272-

7966. The examiner can normally be reached on Monday to Friday from 7:30AM to

4:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Rupal Dharia, can be reached on (571) 272-3880. The fax phone number

for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the

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you have questions on access to the Private PAIR system, contact the Electronic

Business Center (EBC) at 866-217-9197 (toll-free).

RUPAL DHARIA
SUPERVISORY PATENT EXAMINER